

FORM PTO-1390  
(REV. 10-2003)

U.S. DEPARTMENT OF COMMERCE AND PATENT AND TRADEMARK OFFICE

ATTORNEY'S DOCKET NUMBER

2006164-0002

(10652-006)

TRANSMITTAL LETTER TO THE UNITED STATES  
DESIGNATED/ELECTED OFFICE (DO/EO/US)  
CONCERNING A FILING UNDER 35 U.S.C. 371

U.S. APPLICATION NO. (If known, see 37 CFR 1.5)

Not Yet Assigned

104537146

INTERNATIONAL APPLICATION NO.  
PCT/CA03/001893INTERNATIONAL FILING DATE  
December 3, 2003PRIORITY DATE CLAIMED  
December 3, 2002

## TITLE OF INVENTION

DERIVATIVES OF SUCCINIC AND GLUTARIC ACIDS AND ANALOGS THEREOF USEFUL AS INHIBITORS  
OF PHEX

## APPLICANT(S) FOR DO/EO/US

Denis Gravel, Elaref S. Ratemi, Mostafa Hatam, Guy Boileau, Philippe Crine, and Isabelle Lemire

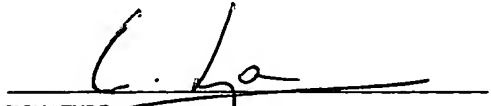
Applicant herewith submits to the United States Designated/Elected Office (DO/EO/US) the following items and other information:

1. ☒ This is a **FIRST** submission of items concerning a filing under 35 U.S.C. 371.
2. ☐ This is a **SECOND** or **SUBSEQUENT** submission of items concerning a filing under 35 U.S.C. 371.
3. ☐ This is an express request to begin national examination procedures (35 U.S.C. 371(f)). The submission must include items (5), (6), (9) and (21) indicated below.
4. ☐ The US has been elected (Article 31).
5. ☒ A copy of the International Application as filed (35 U.S.C. 371 (c)(2))
  - a. ☐ is attached hereto (required only if not communicated by the International Bureau)
  - b. ☒ has been communicated by the International Bureau.
  - c. ☐ is not required, as the application was filed in the United States Receiving Office (RO/US).
6. ☐ An English language translation of the International Application as filed (35 U.S.C. 371 (c)(2)).
  - a. ☐ is attached hereto.
  - b. ☐ has been previously submitted under 35 U.S.C. 154(d)(4).
7. ☐ Amendments to the claims of the International Application under PCT Article 19 (35 U.S.C. 371 (c)(3)).
  - a. ☐ are attached hereto (required only if not communicated by the International Bureau).
  - b. ☐ have been communicated by the International Bureau.
  - c. ☐ have not been made; however, the time limit for making such amendment has NOT expired.
  - d. ☐ have not been made and will not be made.
8. ☐ An English language translation of the amendments to the claims under PCT Article 19 (35 U.S.C. 371 (c)(3)).
9. ☐ An oath or declaration of the inventor(s) (35 U.S.C. (c)(4)).
10. ☐ An English language translation of the annexes of the International Preliminary Examination Report under PCT Article 36 (35 U.S.C. 371 (c)(5)).

## Items 11 to 20 below concern document(s) or information included:

11. ☐ An Information Disclosure Statement under 37 CFR 1.97 and 1.98.
12. ☐ An assignment document for recording. A separate cover sheet in compliance with 37 CFR 3.28 and 3.31 is included.
13. ☒ A preliminary amendment. (9 pp.)
14. ☐ An Application Data Sheet under 37 CFR 1.76.
15. ☐ A substitute specification.
16. ☐ A power of attorney and/or change of address letter.
17. ☐ A computer-readable form of the sequence listing in accordance with PCT Rule 13ter.2 and 37 CFR 1.821 - 1.825.
18. ☐ A second copy of the published international application under 35 U.S.C. 154(d)(4).
19. ☐ A second copy of the English language translation of the international application under 35 U.S.C. 154(d)(4).
20. ☐ Other items or information:
  - ☒ Written Opinion (PCT Rule 66) (9 pp.)
  - ☒ Amendment and Response under Article 34 PCT to the Written Opinion (24 pp.)
  - ☒ Certificate of Express Mailing (1 pg.)
  - ☒ Return Postcard
  - ☐
  - ☐

Express Mail No. EV 170393369 US  
3932012\_1.DOCAtty. Docket No.: 2006164-0002  
Client Ref.: 10652-006  
Customer No.: 24280

|   |              |  |             |  |          |  |
|---|--------------|--|-------------|--|----------|--|
| U.S. APPLICATION NO. (if known, see 37 CFR 1.5)<br>Not Yet Assigned <b>10/537146</b>  |              | INTERNATIONAL APPLICATION NO.<br>PCT/CA03/001893 |             | ATTORNEY'S DOCKET NUMBER<br>2006164-0002<br>(10652-006)  |          |  |
| 21. <input checked="" type="checkbox"/> Other items or information:<br><b>BASIC NATIONAL FEE (37 CFR 1.492 (A) (1) – (5)):</b><br><br>Neither international examination fee (37 CFR 1.482)<br>nor international search fee (37 CFR 1.445(a)(2)) paid to USPTO<br>and International Search Report not prepared by the EPO or JPO ..... \$1080.00<br><br>International preliminary examination fee (37 CFR 1.482) not paid to<br>USPTO but International Search Report prepared by the EPO or JPO ..... \$920.00<br><br>International preliminary examination fee (37 CFR 1.482) not paid to USPTO<br>but international search fee (37 CFR 1.445(a)(2)) paid to USPTO ..... \$770.00<br><br>International preliminary examination fee (37 CFR 1.482) paid to USPTO<br>but all claims did not satisfy provisions of PCT Article 33(1)-(4) ..... \$730.00<br><br>International preliminary examination fee (37 CFR 1.482) paid to USPTO<br>and all claims satisfied provisions of PCT Article 33(1)-(4) ..... \$100.00<br><b>ENTER APPROPRIATE BASIC FEE AMOUNT =</b> |              |  |             | <b>CALCULATIONS PTO USE ONLY</b>   |          |  |
|   |              |  |             | \$920.00   |          |  |
| Surcharge of \$130.00 for furnishing the oath or declaration later than 30 months from<br>the earliest claimed priority date (37 CFR 1.492 (e)).  |              |  |             | \$130.00   |          |  |
| CLAIMS  | NUMBER FILED | NUMBER<br>EXTRA                                  | RATE        |  |          |  |
| Total claims  | 21 - 20 =    | 1  | 1 x \$18.00 | \$18.00  |          |  |
| Independent claims  | 1 - 3 =      | 0  | 0 x \$86.00 | \$   |          |  |
| MULTIPLE DEPENDENT CLAIM(S) (if applicable)   |              |  | + \$290.00  | \$290.00   |          |  |
| <b>TOTAL OF ABOVE CALCULATIONS =</b>  |              |  |             | \$1358.00  |          |  |
| <input checked="" type="checkbox"/> Applicant claims small entity status. See 37 CFR 1.27. The fees indicated above<br>are reduced by ½.  |              |  |             | \$   |          |  |
| <b>SUBTOTAL =</b>   |              |  |             | \$679.00   |          |  |
| Processing fee of \$130.00 for furnishing the English translation later than 30 months<br>from the earliest claimed priority date (37 CFR 1.492 (f)).   |              |  |             | \$   |          |  |
| <b>TOTAL FEES ENCLOSED =</b>  |              |  |             | \$679.00   |          |  |
| Fee for recording the enclosed assignment (37 CFR 1.21(h)). The assignment must be<br>accompanied by an appropriate cover sheet (37 CFR 3.28, 3.31). \$40.00 per property +   |              |  |             | \$   |          |  |
| <b>TOTAL FEES ENCLOSED =</b>  |              |  |             | \$   |          |  |
|   |              |  |             | <b>Amount to be<br/>refunded:</b>  | \$       |  |
|   |              |  |             | <b>charged:</b>  | \$679.00 |  |
| a. <input checked="" type="checkbox"/> A check in the amount of \$679.00 to cover the above fees is enclosed.<br>b. <input type="checkbox"/> Please charge my Deposit Account No. 03-1721 in the amount of \$            to cover the above fees.<br>A supplicate copy of this sheet is enclosed<br>c. <input checked="" type="checkbox"/> The Commissioner is hereby authorized to charge any additional fees which may be required, or credit any<br>overpayment to Deposit Account No. 03-1721. <b>A duplicate of this sheet is enclosed.</b><br>d. <input type="checkbox"/> Fees are to be charged to a credit card. <b>WARNING:</b> Information on this form may become public. <b>Credit card<br/>             information should not be included on this form.</b> Provide credit card information and authorization on PTO-2038.  |              |  |             |  |          |  |
| <b>NOTE: Where an appropriate time limit under 37 CFR 1.495 has not been met, a petition to revive (37 CFR 1.137 (a)<br/>         or (b)) must be filed and granted to restore the application to pending status.</b>   |              |  |             |  |          |  |
| <b>SEND ALL CORRESPONDENCE TO:</b><br><br>Patent Group<br>Choate, Hall & Stewart<br>Exchange Place<br>53 State Street<br>Boston, Massachusetts 02109  |              |  |             |  |          |  |
|   |              |  |             | SIGNATURE<br><br>Charles E. Lyon, D.Phil.<br>NAME<br>56,630<br>REGISTRATION NUMBER |          |  |

ATTORNEY DOCKET NO: 2006164-0002

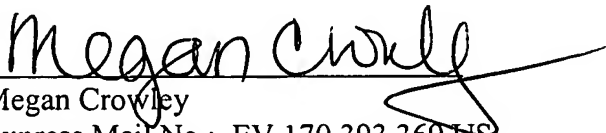
**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

Applicant: Denis Gravel, *et al.*  
International Application No.: PCT/CA03/001893  
International Filing Date: December 3, 2003  
Priority Date: December 3, 2002  
Title: DERIVATIVES OF SUCCINIC AND GLUTARIC  
ACIDS AND ANALOGS THEREOF USEFUL AS  
INHIBITORS OF PHEX

Mail Stop PCT  
Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

**Certificate of Express Mailing**

I hereby certify that the foregoing documents are being deposited with the United States Postal Service as Express Mail, in an envelope addressed to Mail Stop PCT, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on this date of June 2, 2005.

  
Megan Crowley  
Express Mail No.: EV 170 393 369 US